

STUDY OF TEACHERS' AND STUDENTS' EXPERIENCES ON VIRTUAL LEARNING

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ABSTRACT

The present study is an attempt to study the experiences of teachers and students at degree level in the state of Assam. In the study 20 degree colleges, 50 teachers and 200 students were given their responses in a questionnaire. The findings of the study reveals that the virtual classroom is a teaching and learning environment located within a computer mediated communication system. It consists of asset of group communication and work "spaces" and facilities that are constructed in software. Virtual learning, environments are hugely diverse in size, capability and services offered and can cater for individuals ranging in attainment, ages, and special needs. Virtual schools are of three broad categories i.e., independent, collaborate and broadcast. However, the present paper focuses on different terminologies used for virtual learning, merits & limitations of virtual learning along with the special features of virtual learning environment. Moreover, the paper highlights the role of teacher in the context of virtual learning environment.

KEYWORDS: Virtual Learning, E-learning, Web Based Learning

INTRODUCTION

In the recent era of globalization, technological advancement has increased dramatically in every sphere including mainstream education. These advances have introduced new educational nomenclature i.e. "virtual education", "virtual classroom", "virtual Universities", "Online Courses", "electronic" and "cyberspace institution" etc.

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A virtual classroom environment successfully mixes up different media inputs i.e.—

- (a) Face-to-face plus virtual classroom which can vary from adding system use to enrich on-campus courses conducted to traditional means, to distance courses where system, use is supplemented by one or two factto-face meetings
- (b) Virtual classroom as the sole means of delivery, with the use of print media in the form of text books or course notes, and
- (c) Multi-media i.e., virtual classroom plus video, audio or audio- graphic media. Thus, there is a move towards multi-media based interactive learning process and computer assisted instructional system.

Review of Related Literature

Traditional or face-to-face instructional environments have been criticized for encouraging passive learning, ignoring individual differences and needs of the learners, and not paying attention to problem solving, critical thinking, or other higher order thinking (Banathy, 1994; Hannum & Briggs, 1982). On the contrary, new advances in Internet-based technology have brought challenges and opportunities to education and training, in particular through

online instruction. Online instruction is a form of distance education delivered over the Internet. Studies have shown that online instruction offers a major break-through in teaching and learning since it facilitates the exchange of information and expertise while providing opportunities for all types of learners in distant or disadvantaged locations (Hill, 1997; Webster & Hackey, 1997). Online learning is of two types. Some students who cannot afford to access a university or college campus may take programmes by way of distance education offerings. Others may engage in distributed learning or hybrid classes in that they combine some elements of on campus teaching with online access to materials and discussion forums. While online instruction is gaining popularity, it is not free from criticisms posed by traditional print-based faculty. Many educators and trainers do not support online instruction because they do not believe it actually solves difficult teaching and learning problems (Conlon, 1997) while others are concerned about the many barriers that hinder effective online teaching and learning. These concerns include the changing nature of technology, the complexity of networked systems, the lack of stability in online learning environments, and the limited understanding of how much students and instructors need to know to successfully participate using communication and information technology [CIT] (Brandt, 1996). Online instruction also threatens to commercialize education, isolate students and faculty, and may reduce standards or even devaluate university degrees (Gallick, 1998). While most courses can benefit to some degree from an internet component, not all courses can be effectively transformed from a hands-on classroom experience to a totally computer-based learning environment. Furthermore, faculties cannot overlook the risks anticipated in financial management and technical support for faculty. Within the periphery of technical support, a faculty needs to have sufficient allocation of revenues to units that take the risk of converting their face-toface programmes to an online one. Pilot projects such as these may warrant unnecessary yet important expenditure. A faculty needs to understand the importance of retaining professionalism in this transitional period. A team approach to course development and delivery is a prime when testing and assessing this change in curriculum delivery

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OBJECTIVES

- To study the teachers experiences on virtual learning at degree colleges
- To study the students experiences on virtual learning at degree college

METHODOLOGY

The study is basically a descriptive survey. All the teachers and students of degree colleges of Assam are the population. Kamrup district was the accessible population. 20 degree colleges from Kamrup district (Both rural and Urban) was selected. Out of 20 colleges 50 teachers and 200 students of all streams were selected for study. The teachers and students were given separate questionnaire to fill-up. The questionnaires basically included items related to merits, demerits, virtual learning environment and role of the teacher.

FINDINGS OF THE STUDY. Merits of Virtual Learning:

- Virtual classrooms are more accessible, flexible and convenient in their approach towards education, students and teachers.
- Virtual learning environment encourages freedom of expression and students are more open to communicate and express opinion and thoughts freely.
- Virtual learning is also considered as online learning and has a valuable learning experience due to its novelty effects, which creates a perception of increased value
- Online courses supported critical thinking skills, leadership, communication Problem solving and ethics.
- Through virtual learning learners work at their own pace and take time to analyze and synthesize the learning materials
- Multi-media use has made the virtual learning more interesting and lively, thus has paved the way for fulfilling the emerging needs of higher education (i.e., mass education professional education) in 21st Century India.
- The virtual textbooks move the learners beyond content mastery to information seeking and problem solving skills. This enables the learner to evaluate and synthesize information from diverse sources and understand and apply the difference between facts and opinions, grasp multiple and diverse perspectives and draw insights from these and utilize these within the context of one's own knowledge base and experiences
- The Web seems to be more suitable for learning, where the information can be delivered in both linear and non-linear format. It can be presented via multi-media with text, pictures, video, sound and animation. Vast amount of information can be searched and downloaded from Internet.
- The instructor of a virtual classroom may use the whiteboard to answer questions from students. Such tools allow images to be displayed, manipulated, annotated, and shared between two learners or among a whole group
- In virtual learning environment, list servers can be used to redistribute e-mail messages. Usenet newsgroups, computer conferencing and collaborative work spaces may serve for sharing this kind of interactions.
- More dynamic questions and answer interaction can be created using text-based chat sessions, text-based virtual learning environments and net-based virtual auditorium.

- The net-based virtual auditorium systems are more sophisticated and provide voice communications and more features of traditional classrooms such as slides, application sharing and students' feedback.
- Virtual classrooms use videoconferencing and teleconferencing to make the presentation more attractive and lively.
- Online courses offer more flexibility, convenience and access to students.
- Virtual classrooms promote collaborative learning attitude among students.
- Through Web-based learning, vast amount of information can be searched, reorganized and downloaded from decentralized worldwide digital libraries.

Demerits of Virtual Learning:

- Learning in virtual classroom is not natural and spontaneous rather artificially created.
- Virtual classroom lacks the human touch.
- The virtual students seem more frustrated, not only from the technology but from the inability to ask the teacher questions in a face-to-face environment.
- The virtual learning environment lacks human face-toface interaction
- Virtual classrooms are suitable for higher learning only, not for primary level children.
- For availing the facilities of virtual learning the learner has to be matured, self-motivated, computer literate and well versed with the components of virtual classroom.
- There is no scope for testing the entry level behaviours; thus a teacher cannot judge the degree of disparity among students.
- In a virtual classroom set up, the role of a teacher is significant but students' response is secondary.
- In virtual classroom, the teacher's communication skill is more important than any other competencies
- There is a little scope for the all-round personality development of the children. Individual caring, counselling, emotional sharing mentoring etc. are absent in virtual classrooms
- There is little scope for direct teacher-student intervention and two-way communication.
- The factors, like subject expertise, communication skill, expression through body language, personality, skill of holding students' interest and attention play a very crucial role in virtual learning and the success of the programming course primarily depends on these factors.

Virtual Learning Environment:

Virtual Learning Environment (VLE) is a term that contains the online learning services. This is also called learning platform that organizes and provides access to online learning services for the students, teachers and administrators. These services include access control, provision of learning content, e-learning tools and administration of user groups. In Virtual Learning Environment (VLE) the learner—

- is at a far off place from the tutor or teacher or instructor;
- uses some form of technology (obviously internet connected computer) to access the learning resource materials which are web-based;
- also interacts with the teacher/tutor or instructor and other learners;
- is provided with some form of support to meet his/her

need

A virtual learning environment is a designed information space. Virtual environment compared to any information space is that it is populated. The users are inside the information space and see a representation of themselves and/or others in the space. As soon as students see who else is interested by which information, the space becomes inherently social. Therefore it is called as a social space.

The virtual environment is explicitly represented. The representation of the learning environment ranges from text-based interfaces to the most complex 3D graphical output. These representations influence the student work. Representations of the space may have an impact on the learning process beyond motivational aspects.

In the virtual environments students become not only active but the actors. Most specific feature of the virtual learning environment is that it is a set of activities in which the students construct and share objects. Most often these objects are Web pages. Writing activities (producing syntheses, study reports, newspapers, etc.) are very popular in schools. Students are not restricted to consuming Web information, they become information producers. Up to several weeks of work are carried out upstream to move to the Web. This work can be integrated in the virtual learning environments. This enables learners to share their ideas and informal notes. This shows that the notion of a learning activity in virtual learning environments refers to something richer than in individual courseware.

Virtual learning environment is not restricted to the distance education. It provides them with time flexibility, a growing concern in our society.

A virtual learning environment integrates a variety of tools supporting multiple functions: information, communication, collaboration, learning and management.

The virtual environment overlaps with the physical environment the tools that can be found in a classroom. Most virtual learning environments include:

- A variety of non-computerized learning resources: concrete manipulation tools, instruments, books.
- A variety of interactions that are not computermediated: face-to-face discussion among students, lectures by the teacher, group discussions, plus traditional media such as letters, TV, phone and fax.
- A variety of activities that are not computer-based: field trips, role playing.

Role of Teacher:

- Create a website where students can check their own readiness for online learning.
- Create private discussion section forum for each group that they can communicate with one another without the entire class being able to read their comments.
- Schedule chat rooms and weekly bulletin boards that students must respond to keep them on task and in touch.
- Create a frequently asked question (FAQ) list that is accessible from main web page.
- Create bulletin board works well for discussion of issues and peer critique of scholarly writing; students need to be given points for participation and guidelines for what is appropriate discussion on the bulletin board.

 Divide the class into groups and assign each group a different course topic to teach to the rest of the class.

Though it is true that virtual learning environments can improve the quality of education or reduce the costs of educational systems and these environments have some potential effects but the past tells us that it is very difficult to set up the conditions that turn potential into actual effects. The future of virtual reality in education is like a sculpting fog, but there are definite pressures that will bring virtual reality to education in the near future.

REFERENCES

- Banathy, B. (1994). Designing educational systems: Creating our future in a changing world. In
- C.M. Reigeluth & R.J. Garfinkle (Eds.), Systematic change in education (pp. 27-34). Engle- wood Cliffs, NJ: Educational Technology Publications
- 3. Conlon, T. (1997). The internet is not a panacea. Scottish Educational Review, 29(1), 30-38
- Gallick, S. (1998). Technology in higher education: Opportunities and threats. (ERIC Document Reproduction Service No. ED415929
- Hannum, W., & Briggs, L. (1982). How does instructional system design differ from traditional
- 6. instruction? Educational Technology, 22(1), 9-14.
- Hill, J.R. (1997). Distance learning environments via world wide web. In B.H. Khan (Ed.), Web-based instruction (pp. 75-80). Englewood Cliffs, NJ: Educational Technology Publications
- Liaw, Shu-sheng (2000) 'Virtual textbooks: features and implementation' Educational Technology", July-August.
 Murahari B., and Vijay kumar V. (2008) 'New Technologies for
- Murahari B., and Vijay kumar V. (2008) 'New Technologies for Teaching and Learning in the information age' University news Vol.46 Oct. 6-12.
- Naseema C.; (2004) 'From Blackboard to the Web-integrating Technology and Education' Kanishka Publishers, Distributors, New Delhi-110002.
- Patil V. T. (2005) 'Virtual Education—dimensions of Educational Resources 'Authors Press Publishers of Scholarly Books, New Delhi (India).
- 12. Turoff, M. (1995) 'Designing a virtual classroom'. Proceedings, ICCA! 95, Taiwan.
- 13. Venkataiah N., (2004) 'Educational Technology' APH Publishing Corporation, New Dehli-1 10002.
- Yadav, M.S (2011) Innovative idea in Education: Vertual Learning Environment, APH Publishing Corporation, New Dehli-1 10002.